

## ABSTRACT

5 A system that facilitates non-invasive in-line characterization of parameters of  
VLSI circuit interconnects is provided. A plurality of micro-electro-mechanical system  
(MEMS) cantilevers apply voltage(s) to VLSI circuit interconnect(s) without physical  
contact thereto. A measuring component measures deflection characteristics of the  
cantilevers, the deflection(s) correspond to electrical forces generated from the applied  
voltage(s) as passed through VLSI circuit interconnect(s). A component computes  
characteristics of the VLSI interconnect based at least in part upon the measured  
10 deflection characteristics.